DOCUMENT RESUME

ED 090 864 HE 005 464

AUTHOR Gold, Gerald G.
TITLE Project Funding and Institutional Innovation in Higher Education.
PUB DATE 16 Apr 74
NOTE 26p.; Presented at the American Educational Research Association (Chicago, Illinois, 16 April 1974)

EDRS PRICE MF-$0.75 HC-$1.85 PLUS POSTAGE
DESCRIPTORS Case Studies; Educational Finance; *Educational Innovation; Financial Support; *Higher Education; *Institutional Research; Program Costs; *Program Proposals; *Projects; School Funds
IDENTIFIERS *University of Massachusetts

ABSTRACT

The views and examples found in this paper are based on a case study of the School of Education at the University of Massachusetts. The principal objective of this case study was to understand how an organization in higher education employed available resources in order to promote both internal and external reform in the field of higher education. Among the more important issues included under this broad objective are: (1) The role of individual and institutional reputation in channeling resource flow between a marketplace of funding agencies and higher educational organizations. (2) The intended and actual uses of administrative structures regulating the flow of resources from a university's external environment, as well as among the subordinate parts of the university. (3) The uses of project resources as sets of incentives for individual participation in reputedly innovative, problemsolving, activities. (4) The role of organizational leadership in creating, maintaining, and coordinating both resource flow and the variety of incentives for innovative activities that may be derived from that flow. One of the study's principal recommendations is to create and maintain a national network of incentives for innovation in education. (Author/PG)

U S DEPARTMENT OF HEALTH
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION
THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

ED 090864

HE 005 464

5.05

FOR PRESENTATION: American Educational Research Association
Chicago, Illinois; 16 April 1974

TITLE: Project Funding and Institutional Innovation in Higher Education

AUTHOR: Gerard G. Gold, General Research Corporation, McLean, Virginia

Introduction

The views and examples found in this paper are based on a case study of the School of Education, University of Massachusetts. Over 100 interviews with 79 subjects were conducted during 1972, focusing on the flow of resources for 39 funded projects active at the School during 1971-1972. Project funding from federal and state government agencies and private foundations, combined with human and material resources available to the School, was intended to be a key element in a strategy to build a national reputation for the organization as a whole and to enable members to have "a maximum positive impact upon educational thinking, training, and practice."

The principal objective of the case study was to understand how one organization in American higher education employed available resources in order to promote both internal and external reform in the field of education. Among the more important issues included under this broad objective were:

1. The role of individual and institutional "reputation" in channeling resource flow between a marketplace of funding agencies and higher education organizations.

2. The intended functions and actual uses of administrative structures regulating the flow of resources (a) from a university's

external environment, as well as (b) among the subordinate parts of the university.

3. The uses of project resources as sets of incentives for individual participation in reputedly innovative, problem-solving activities.

4. The role of organizational leadership in creating, maintaining, and coordinating both resource flow and the variety of incentives for innovative activities which may be derived from that flow.

The Context of the Case Study

Two major themes dominate the contemporary discussions of American post-secondary education. One is the theme of resource utilization, the other that of institutional reform and innovation. The first indicates a concern for the effectiveness with which administrators, faculty, students, and society in general employ financial and human resources in pursuit of their many goals. The second indicates a concern for the definition and selection of the goals themselves. Thus the two themes complement each other as the two aspects of an ends-means analysis intended to make post-secondary education an ever more productive, more responsible sector of American and world society.

Overall, the diversity and depth of outside funding in American higher education has been given credit for the relative openness to innovation of American universities in comparison to their European counterparts (Clark, 1971; Yates, 1971). In this view, openness to innovation varies with the amounts of outside support specifically assigned to innovative activities, with an organizations's security in wealth and prestige (high degrees of security resulting in less fear of risk-taking), and with the extent to which the organization is forced to compete in major markets for students, faculty and funds.

The mood of the present decade has been one of financial stabilization. The slower pace of financial growth has brought on a period of caution, even crisis, in institution after institution (Cheit, 1971; Hudgins & Phillips, 1971). The victories and successes of the 1960's -- absorbing massive new student populations, raising faculty salaries and status to attractive levels within American society, increasing the nation's commitments to higher education from about 1 percent to about 2.5 percent of the gross national product -- are being seen now in terms of their once-hidden costs and their newly visible pressures for reform. The bulk of the new student clientele could not be integrated into the scholarly research orientation which had come to dominate faculty ambitions during the previous twenty years (Cross, 1971, 1973). A faculty which gained organizational ascendance by promoting the research ethic is viewed by some as a tenured obstacle to the successful accomplishment of the changed tasks which society set before higher education (Newman et al., 1971).

The yeasty financing of higher education in the 1960's raised expectations of continued comforts which only made more divisive and difficult the necessity of restraining growth while adapting to new expectations, new tasks. In a period of financial stabilization, advocates of reform, well aware of the vested interests found within higher education organizations, have turned to the marketplace as the testing ground for calls on the nation's resources.

All forms of financing are being examined not only in terms of the advantages to the populations most immediately served, but also in terms of the institutional consequences of particular types of resource distribution. Federal and state aid, for example, could reinforce existing institutions through direct grants or it could subsidize market

pressures if distributed as direct student aid, leaving the institutional choices to students. The Carnegie Commission on Higher Education (1972), for example, saw direct tuition assistance as a means of letting students "conduct the search for lower costs, higher quality and greater diversity (p.23)."

Similarly, project funding is now being seen as an available strategy for major institutional reform rather than in its traditional role as an instrument for the achievement of more limited tasks. Project funding has been seen in the past by most funding agencies as a way to use "seed money" for projects of relatively short duration but with the potential for longer-range impact once intellectual and political viability has been proven and the supporting costs absorbed by the "parent" organization. In more recent years, some reformers have looked to project funding as a mechanism which, if funded on a sufficiently large scale, would move from a hit-and-run seed money strategy to a basic competitive structure reshaping the environment of higher and post-secondary education. For example, the Newman task force (1971) suggested that if each state:

> would view itself as a funding agency responding to proposals from individual campuses, flexibility and coordination would both be enhanced. Each campus needs the assurance of a base budget, but probably at least a third of the funding needed could be supplied on a project basis (p. 74).

Moreover, the task force concluded that "the foremost task for public policy is to create conditions under which new educational enterprises can be founded and can endure (p.63)," and recommended the use of a competitive proposal grant system as the best means of implementing that conclusion. Responding to these suggestions, Congress in the higher education amendments of 1972 authorized the use of grants and contr cts

to encourage "the reform innovation and improvement of post-secondary education (U.S. Department of Health, Education, and Welfare, 1973, p.51)."

I have attempted in the paragraphs above to outline the principal conditions shaping the contemporary market for the funding of innovation in American colleges and universities. In the following pages we will be examining how one organization recruited and employed outside funding as the key resource in its own program of innovation and reform. In so doing, we may come to a better understanding of some of the opportunities and problems associated with the project strategy within a university structure.

Reputation and Resources

Three years after the arrival of a new dean of the School of Education, University of Massachusetts, the University's Graduate School invited Daniel E. Griffiths, the dean of New York University's School of Education and a leading student of educational organizations, to assess the School's new programs. "I doubt," Griffiths (1971) wrote, "that any school of education in the United States has ever undertaken so radical and far-reaching a number of changes (p.1)." The image of the School of Education at UMass as an organization undergoing radical experimentation was an image shared by both proponents and opponents of the School's course during the deanship of Dwight Allen.

Highly visible gestures included the cancelling of all courses and degree requirements for doctoral students during the first year of what was known as the "new" School of Education, considering faculty and doctoral students as heirarchical equals in the community of educators, aggressively establishing many contacts between the School and

other education agencies, and focusing the School's energies on project activism in frequent preference to classroom scholarship. The School began to attract national journalistic attention which reinforced this self-anoited image of radicalism (Roberts, 1969; Resnik, 1972; Nathan, 1971; Time, 1970).

Compared to the range of changes occurring elsewhere in American higher education during the 1960's and early 1970's the School was involved in almost every kind of experimentation (Heiss, 1973). Organized internally by fluid "centers" rather than departments, with redefined faculty and student roles, with the restructuring and reconceptualizing of grading and scheduling procedures, course content, governance reform, admissions criteria, student and teacher evaluations, and so forth, the School qualified for recognition as a large-scale educational experiment. Externally, the School's members used funded and non-funded projects dealing with many types of educational change as the principal means of identifying themselves with the vanguard of social reform.

The School advertised itself as a living case of an "alternative" organization still in its formative stages. But how was this alleged alternative, this newly evolved species, able to survive and prosper? That question raises in turn several others, all directed back again to the central issue of how the resources of American society are distributed as incentives or as disincentives for the formation of innovative organizations designed to help solve the problems confronting that society. What are the structural characteristics of innovative systems in higher education? How do individuals with ideas and energy gain the resources and influence needed to establish effective organizations? How are resources used to integrate diverse personal interests into those

organizations, making possible the utilization of accumulated resources for purposes which will be recognized as innovative and worthwhile?

The School's dean readily acknowledged that outside funding was the key element in a strategy to establish the School as a viable institution. In the 1971-1972 fiscal year during which the information for this study was collected, the School was the operational base for projects with awards totalling nearly $4,600,000. At the same time, support received from the State-allocated University of Massachusetts budget amounted to less than $2,400,000. Where the previous dean had counted five funded projects during the final year of his tenure, the new dean could report twenty-three funded projects by the end of his eighteenth month in office (Allen, 1969). During that time, outside forces had added over one million dollars to the School's budget.

Outside funding was available, but equally as important, it was available from a wide variety of sources, each with its own sets of decision makers and its own sets of priorities and criteria. On the one hand, the School was pressed to shape its interests to the will of the marketplace. On the other hand, the market place was not uniform or dictatorial. Both buyer and seller could maneuver in the competition of ideas, personalities, and funds. This is not to say that the competition was perfect. Clear judgments on the merit of ideas and the capabilities of individuals are not always possible under the best of circumstances. The risk of mistaken decisions, absorbed in conventions of assurances such as personal familiarity with the applicant or faith in the reputation of an applicant's institutional associations, may result in biases which inhibit contributions from relatively unknown persons and institutions. But for individuals willing to work within these limitations, the diversity of

sources of project support offered many more incentives, much more reason to hope for success, than a system of resource distribution tied to narrower and fewer sets of funding priorities. Variety of funding sources was, of course, more than matched by variety of applicants. From an agency point of view, the School was one among many applicants.

In the present case, we found that the members of the "new" School were able to forge their identities as innovators and were able to draw on the marketplace for support of projects in the field of education. To do so, required individuals with the ability to establish their personal credibility with agency representatives, to identify areas in which agency and applicant had mutual interests, and to create a rationale for each project, justifying the allocation of resources to the School rather than to some other organization. The repeated success of individuals at the School to do this established the basic facts of the project grant and contract system: that resources from diverse sources were not randomly distributed, and that with astute planning and energetic pursuit, a group of individuals could collect and shape outside funding to their own purposes, building in the process an organization's reputation as an advocate of innovation and reform

Reputation, both personal and institutional, was a central factor in creating the scale and regularity of resource flow for projects at the School. In some instances, project opportunities literally "walked" into the School, while in others, applicants followed "official" proposal procedures. The great bulk of successful projects, however, were developed out of more extensive contacts with agency decison-makers. These contacts involved repeated explorations of the plans, directions, opportunities, and capabilities of both grantor and grantee. Successful project

funding efforts often began not as crisply defined proposals, but rather as explorative, tentative discussions based on apparent mutual concerns. This direct personal contact created the opportunity for direct personal judgment of the abilities and reliability of individuals to whom agency resources would be entrusted. Direct contact, supplemented with histories of past performance and the general reputation of individuals as reported by other observers, was the foundation upon which the bulk of funding decisions appeared to have been made.

Decisions on funding were also tied to the institutional association of the applicant. The University provided operational credibility to project proposals by establishing standards and controls governing the qualifications and actions of individuals participating in projects. Institutional membership implied also acceptance of the applicant by his professional peers and the likelihood of similarly qualified assistance when needed. These many judgments of individual and institutional reputations were made because they were more "rational" predictors of project performance than were the project proposals which dominate the "official" understanding of the funding process. But as a consequence, this system imposed a special burden of proof upon those who wished to step outside the standard solutions or modes of operation.

At the School of Education, the dean was the central figure initiating the flow of outside resources to the School. The meshing of his personal goals with the willingness of the University of Massachusetts to give the new dean a wide mandate to build a School of national standing enabled Dwight Allen to approach funding agencies with a credibility built on both his own past performance as an administrator and advocate

and on the discretionary authority provided in his formal position within the University hierarchy. By recruiting others who shared his broad purposes of large scale activism, and by reshaping administrative structures within the School, the dean sought to establish an organization whose members would both share in and enhance the credibility, discretion, and resources initially and temporarily vested in him. This further meshing of individual and institutional identities was an important component of the success of the School's project strategy.

Structure and Control

Funding agencies looked to the University for proof of an applicant's respectability within his profession and for the accounting of agency funds. University procedures for the approval of project proposals were designed at least in part to serve the interests of funding agencies rather than of the University's own members. Obviously, restrictions of institutional association were part of the price individual members paid in order to qualify for wider recognition outside the University. Equally, providing accounting services was part of the price the University paid in order to qualify as a respected operational base for research and program development, and thus as a recipient of resources.

There are three essential points to be made concerning the function of the organizational structures described in this study. First, it must be recognized that rules and procedures are made to serve the interest of the persons who authorize them. Generally speaking, the purpose of routine procedures is to simplify, "solve," administrative problems: they are administrative responses to perceived pressures. At the University of Massachusetts during the period of this study, the proposal approval structure was concerned chiefly with matters of personnel selection, financial payments,

and potential political involvements. Taken together, these concerns could be grouped under the broader heading of commitments of University resources to project purposes. The multi-level review of proposals and contracts was intended to screen proposed relationships between University members and external agencies for all possible compromises of University resources. This screening in turn compelled individual members to recognize the policies and interests of the University and to frame individual purposes and practices within those boundaries. The proposal review process within the University was, in fact, a form of socialization, inculcating the scruples and propriety of University officials. Thus the associate graduate dean for research, newly appointed in 1971, could report that in contrast to stories of conflict which he had heard before assuming his position, within his own experience proposals from the School of Education did not try to "pull fast ones." He recognized, however, that the only way to guarantee this satisfactory state of affairs was to have an office such as his with a person responsible for reviewing all proposals.

Secondly, it must also be recognized that organizational structure directs communication to selected individuals, designing patterns of social interaction. From the point of view of the project applicant, these patterns represent paths to be followed in order to attain desired outcomes, such as University approval of a project proposal. They also represent paths by which the individual may attempt to influence University policy. The University's interest in administrative structure is to exercise control over its many component parts. Both parties, therefore, can be said to employ organizational structure as a means of routinizing issues that require no new decisions and of testing issues that are being presented for discussion. One might say that without the "excuse"

of outside funding, issues of admissions, salaries, appointments, off-campus involvements, on-campus reorganization and so forth would not have been raised because they would have been only hypothetical. With funding, with the attention and energies of specific individuals directed toward specific, substantive decisions, a wide range of policy issues were brought to the attention of University administrators.

The third point to be recognized is that the design of administrative structures can incorporate crucial incentives or disincentives for innovative projects. The inclusion of these factors can be either intentional or unintentional. Even with the best of intentions to serve all appropriate claims on University approval and resources, a project approval structure may appear to be an obstacle to the goals of members. It is in the concerns made operative in administrative structures, rather than in the rhetoric of public statements, that an organization's goals are enforced. For example, a continued lack of response to the needs of a particular segment of the School's membership--as for example, for a more timely, less cumbersome, review process--is a clear indication of the priorities of the organization's administrators. The tension between seeking to encourage outside funding generally while securing the coordination of information for administrative purposes, the tension between the University seeking to define and preserve its own identity while project staffs seek to make the University an effective agent of support for their purposes, are inevitable tensions which organizational structures are meant to mediate. Not only the design of these procedures, but also the processes by which they are evaluated and changed, incorporate values which may encourage or discourage, may conflict with or support, the values which projects and funding agencies seek to implement.

To put this point another way, one could say that organizational structures and their uses reflect the balance of influence within a particular organization.

Strategy and Authority

The essence of the organizational strategy at the School of Education was to draw on diverse outside resources in order to achieve a freedom of program definition which would not have been possible under the constraints of State and University budgets. By combining the advantages of funds made available from both State and out-of-State agencies, the School administration would be able to minimize their disadvantages. The stability of the one would supplement the flexibility of the other. Through their association with the School, individuals and projects, whatever their principal source of direct support, would be able to share in the extended range of opportunities.

Funded resources supplied incentives of three crucial kinds. One resource was the appeal of projects dealing with important, pressing topics. This appeal to the hopes and ambitions of many individuals and the School's ability to demonstrate its commitment by offering itself as a site for innovative activities made the recruitment of graduate students and faculty possible. For fall semester, 1971, for example, the School attracted 1,819 graduate applicants and enrolled 489 of them. More significantly, even with applications on such a large scale, seventy-five percent of those accepted actually enrolled (University of Massachusetts, Graduate School, 1971). In fall, 1972, with applicants numbering 2,667, the School still enrolled eighty-one percent of those accepted (University of Massachusetts, Graduate School, 1972).

This relevance of project topics to the needs of society and the interests of members was one set of incentives. The opportunities for individual learning and career preparation which were inherent in the design and administration of projects were another set. Project experiences were officially integrated into the curriculum of the School by awarding course credit for project participation. To what extent project activism proved itself as education was never a closed question, remaining a constant topic of concern and debate within the School. But learning by doing was accepted in theory until proven otherwise, and the determination of educational quality on specific projects was left to the evaluation of students and their faculty advisors. Moreover, the learning experiences found in projects were intended to attract faculty interest also.

Finally, funded projects provided incentives through the financial benefits of stipends and salaries and non-financial benefits of travel, secretaries, office space and so forth. All these direct material rewards could improve the productivity and professional visibility of project participants.

Because funded projects held all these incentives, it became a clear priority of the School administration to encourage students and faculty to formulate ideas and participate in both the recruitment of project resources and in the fulfillment of project obligations. While it was important to find resources, it was also important to find individuals who could administer those resources. Thus, it was essential to build within the School an institutional "ethos" which valued project work and removed bureaucratic obstacles from the paths of School

members. Inevitably, the needs of School and University administration conflicted with projects and were seen as obstacles. More importantly, however, the obstacles were recognized as small ones for the most part and the submission of proposals for funding continued, as did the interest in project activities.

The intent of the School's strategy, of course, went beyond offering incentives and providing a structure and organizational "ethos" to assist in their pursuit. The aim was also to draw on project resources once recruited in order to multiply the opportunities and visibility for the organization as a whole. In other words, the intent was to coordinate, integrate, projects as parts of an encompassing plan, rather than let them disperse into isolated activities of temporary duration with benefits restricted to their immediate participants. This coordinative, integrative authority would have to come from outside the projects themselves.

The project system has been criticized in the past because by establishing direct linkages between faculty and funding agencies, it was said to undermine the ability of administrators and faculty groups to govern their organizations. On the one hand, university administrations have grown in order to absorb the management responsibilities brought on by sponsored research and training programs. On the other hand, project grants have increased the independence of grant recipients from central administration and faculty control (Arnold, 1968; Orlans, 1962).

At the School of Education, the administrative role of the dean was asserted as a centripetal force coordinating and redistributing resources. The formal authority of the dean within the University hierarchy was reinforced by his special relationship to that hierarchy, a

relationship derived from understandings reached at the time of his appointment and reformulated over several years by the course of events and additional commitments of University support, both political and financial. All members of the School depended upon the dean for the maintenance of their experimental mandate within the University. As the principal strategist of the School's uses of outside funding, and as the School's principal recruiter of project funding, the dean was also a central authority in the maintenance of the project system. Continuing leadership in the School's relationships with University officials, external funding agencies, school districts, international educational organizations, and the education profession, could not but serve to reinforce the dean's authority within the School regardless of the official delegation of internal decision-making to student-faculty committees.

Centrality to the flow of resources placed the dean in an enviable position as a decision-maker. With official responsibility for much of the School's resource base, and with a clear understanding of the agency expectations to which resource use would be held accountable, he knew when and to what extent resources could be committed to specific purposes. This "very cherished power of any administrator [Allen, interview, April, 1972]" created tensions. The School Council and individual members of the School could easily see on-the-spot decisions as thoughtless, or intentional, disregard for the governance structure. Yet, being in no position to claim authority over a flow of information and resources unique to the personality rather than to the position of the dean, the Council could not exercise discretionary power of its own. Caught in this tension, members who observed this behavior could

oscillate between acceptance and resentment of periodic unilateral decision-making. Acceptance was encouraged to the degree that the decisions proved to be benevolent ones.

Within the University and the School, it was well understood that the unusual talents of the dean made possible the successful concentration of formal and informal authority. It was the expectation of this individual success that had convinced the University to allow the new dean the discretion to reshape the "old" School. Within the "new" School, a similar expectation, or hope, bridged the apparent contradiction of the dean's wide-ranging freedom to make decisions affecting the School and the similar freedom of School members to develop their own interests and projects. As the dean fulfilled these expectations with actual performance, rapidly expanding both the School's resource base and its national visibility, he was able to solidify his authority with the assistance of the University's return of overhead through several special allocations and with direct and indirect contributions from the projects themselves.

The Future of a Strategy

It cannot be assumed that the success bred of several years assured a relative permanence of institutional relationships. Changes in the funding marketplace, changes in the political acceptance of the School's projects, changes in personnel within the School and University would have major impact on the long-term viability of the institution-building strategy described in this study. Survival would reflect the continuing accuracy of judgments which assumed that social conditions

existed which permitted such a strategy to succeed and that these conditions could be harnessed to the development of a vital school of education. The dependence on outside project funding was intended to make the School's members vulnerable, and therefore alert, to outside influences. All members would be quick to know of shifting currents directly affecting their careers.

The members of every organization seek to protect themselves from disasters. As the School's reputation grew and became established as an outgrowth of many short-term projects, one might have expected to witness efforts to protect the newly vested interests from the risks inherent in relying on transitory resources. One might expect to see the School's members trying to insulate themselves from the possible loss of substantial outside funds and from the possible loss of the dean himself. In fact, as the School grew and brought national attention to the University, faculty positions were absorbed into the "hard" State budget and commitments were made of University space for School offices and activities. Faculty, it was recognized, needed the security of "hard" support within a University that would not commit itself to support "soft" faculty beyond the terms of their grants. Students, on the other hand, with lower financial expectations and far shorter residency expectations, could more easily absorb the fluctuations of funding built into the project system.

As students and faculty became more differentiated in regard to their dependence upon the project system, one might also expect some differentiation as regards their loyalty to it. For students, the system had meant more than financial support. Projects had provided the strongest rationales for the reconceptualization of faculty and student

responsibilities within the School, for the continuing redefinitions of academic areas of interest, for focusing attention social problems needing solutions rather than on more removed academic observations of those problems, for, in sum, the restructuring of the School. Without funding, graduate students would have far fewer options from which to seek financial support related to their program interests, with campus-related teacher training supervision being the principal source of assistantships. In many ways, faculty life without the pressures of a project "ethos" would have been less hectic and more encouraging of other kinds of rewards. Faculty could be tempted to reestablish for themselves a system of publishing and conferences parallel to their professional peers elsewhere. Decreased dependence on the dean and the project system for resources could only be counteracted by careful recruiting of new faculty dedicated to the activist concerns of the School's earlier experience with outside funding.

Maintaining a membership of persons who valued innovation would be the first requirement of any strategy to institutionalize the operational style of the School of Education as this study found it in 1971-1972. Maintaining a system of incentives providing appropriate rewards for participation in innovative activities would be the second requirement. Assuring that these requirements are fulfilled, and that the organizational "ethos" is maintained, remains the chief responsibility of creative administration.

Outside funding was necessary in order to overcome internal University resistances to change. Be defining the School as an experiment, and then by allowing outside resources to subsidize

the experiment, the University administration was able to by-pass much of the divisive internal debate which would have necessarily preceded reallocations of University resources. Instead of preceding, and thereby blocking, action, these debates could now take place concurrently with the activities. Opinions could be challenged and changed by example and precedent rather than by precept. Further, other changes in curriculum and organizational practice to which the University may have had no serious objection actually happened only because of the press of events motivated by live projects. From this perspective, funded projects were less important because they were funded than because they were concrete projects with expectations of performance established both within and outside the University. A merely internal project could be dropped and forgotten. One with the press of outside accountability and visibility gained a commensurate importance. As the School's reputation became more established, the project system remained the principal guarantee that the School's responsiveness to social issues would not diminish. The flow of outside resources from School projects had proved itself an invaluable stimulus to action.

The flow of resources performed two different functions in regard to goal formation. On the one hand, if gained with sufficient freedom from external restraints, or if gained under terms which coincided with personal interests, project resources were powerful incentives for the pursuit of individual goals. On the other hand, the very availability of resources could be an equally powerful incentive for the reassessment and substitution of individual goals. Getting outside funding, the goal of grantsmanship, was at a professional academic level only a partial means to the reform of the School and the reform of

American education. A longer range question posed by this study, however, must be whether the very ethos of the project orientation, combined with the formal and informal structural bias toward project activism could come to undermine the reformist goals, substituting for them a fascination with the techniques of grantsmanship. This again is a question of balance and judgment. It is a question of whether a large group of individuals, reacting sharply to the persistent tendency of professional post-secondary educators to remove themselves from the conflicts of social reform, could organize themselves in ways which encouraged immersion in those conflicts while still maintaining perspective on the larger social and educational issues involved. Immersion in conflict could be an intense curriculum for individual learning. Assuring that the choice of conflicts and the method of immersion were educationally valuable, however, would require great determination in asserting the social goals, the organizational identity, of the "new" School of Education as sets of standards by which new opportunities for resources and experiences could be judged by a periodically changing membership.

Continued use of the project grant and contract system

Money, to state the obvious, is an invention and tool of human purposes. The sine qua non for the creative use of financial resources in institutional reform and innovation, in education or elsewhere, is creative leadership. The problem derived from these assertions is that of shaping the delivery and accounting of financial resources in ways which encourage creative leadership to make itself known and felt. Outside project funding, this study has held, can be used as incentives for

innovative behavior. This result is precisely what was intended by the formation of many philanthropic foundation. Our emphasis here would be on the expansion of the project strategy as an incentive for reform and as a means of identifying leadership talent. Recognizing the talents of individuals who can organize innovative projects and who can organize the administrative and political support systems upon which individual projects depend would add another, and in our view crucial, dimension to the traditional criteria of research and teaching by which members of the education profession are judged. Legitimizing creative leadership is perhaps the most important reform that agency money can buy.

At the same time, the question of proper balance of incentives within the nation's post-secondary education system must remain open to careful scrutiny. Suggestions such as that by the Newman task force (Newman, et al., 1971) that the States supply at least one-third of each campus budget on a project basis raise concerns that a new professional elite could be created. Some may respond that this elite already exists in the form of national "grantsmen" at every major university. But the present dominence of more academic criteria has been a restraining influence. Balance remains the central issue, one which will have to be studied and decided at many levels. Meanwhile, our broad view is that the enlarged use of the project grant and contract system offers opportunities for effective innovation in education.

Expand the diversity of funding agencies

The ability of incipient leadership talent to achieve operational flexibility within a university environment is enormously enhanced by the

availability of outside funding. But the diversity of funding opportunities is as important as basic availability. Diversity ensures that freedom at one location is not paid for by ultimate dependence at another. Essentially, a diversity of agencies means that resource allocation decisions take place within a flux of multiple priorities. Diversity of funding ensures that debate on the issues of educational organization and experimentation will continue, that individuals with ideas and institutions with programs can seek support in an intellectual marketplace. The competition of ideas should be played for real stakes in anticipation of real outcomes.

Diversity of funding will become increasingly important to the nation's educational system as that system becomes more rationalized from an administrative point of view. Publically supported colleges, universities, and other forms of post-secondary education are playing a dominant role in shaping the United States educational resources. Standardization of management practices, faculty organization, campus architecture, and student curricular options is the underlying threat which has bred the present interest in innovation. The creation of more, and larger, public and private agencies whose responsibility is to elicit, review, support, and evaluate alternative programs will be an essential step in preserving and expanding the diversity which has been the strength of the nation's higher education system. In the past, that diversity has been based on a foundation of sectarian and private giving. In the future, it appears, the secularization and professionalization of colleges and universities must be matched by a professionalization of giving. The trick will be to preserve diversity of giving and avoid the

potential uniformity of state control. Creating and maintaining a national network of incentives for innovation in education is, therefore, one of this study's principal recommendations. It is also a topic which calls for further study and advocacy.

References

Allen D. W. Annual report, 1968-1969, School of Education, University of Massachusetts. Unpublished report, University of Massachusetts, 1969.

Allen, D. W. Interview. Amherst, Massachusetts, April 3, 1972.

Arnold, C. K. The government and university science: Purchase or investment? In H. Orlans (ed.), Science policy and the university. Washington, D.C.: The Brookings Institution, 1968.

The Carnegie Commission on Higher Education. The more effective use of resources: An imperative for higher education. New York: McGraw-Hill, 1972.

Cheit, E. F. The new depression in higher education: A study of financial conditions at 41 colleges and universities. New York: McGraw-Hill, 1971.

Clark, T. N. Institutionalization of innovations in higher education: Four models. In J. V. Baldridge (ed.), Academic governance. Berkeley: McCutchan, 1971.

Cross, K. P. New students in the new world of post-secondary education. Address presented at the meeting of the American Association for Higher Education, Chicago, March 1973.

Cross, K. P. New students of the '70s. The Research Reporter, 1971, 6(4), 1-5.

Griffiths, D. W. Letter to M. H. Appley, February 10, 1971. Graduate School, University of Massachusetts.

Heiss, A. An inventory of academic innovation and reform. Berkeley: The Carnegie Commission on Higher Education, 1973.

Hudgins, G., and Phillips, I. People's colleges in trouble: A financial profile of the nation's state universities and land-grant colleges. Washington, D.C.: National Association of State Universities and Land-Grant Colleges, 1971.

Nathan, R. S. Messiah of the ed schools. Change, October, 1971, pp. 51-56.

Newman, F., Cannon, W., Cavell, S., Cohen, A., Edgerton, R., Gibbons, J., Kramer, M., Rhodes, J., and Singleton, R. Report on higher education. Washington, D.C.: U.S. Government Printing Office, 1971.

Orlans, H. The effects of federal programs on higher education: A study of 36 universities and colleges. Washington, D.C.: The Brookings Institution, 1962.

Resnik, H. S. Are there better ways to teach teachers? Saturday Review, March 4, 1972, pp. 46-50.

Roberts, W. Voices in the classroom. Saturday Review, January 18, 1969, p. 63.

Time. Frenzy at UMass. December 21, 1970, p. .

University of Massachusetts, Graduate School. Graduate School fact book 1971-1972. Amherst, Massachusetts: Author, 1971.

University of Massachusetts, Graduate School. Graduate School fact book 1972-1973. Amherst, Massachusetts: Author, 1972.

U.S. Department of Health, Education, and Welfare, Office of Education, Bureau of Educational Personnel Development. Handbook for directors: Programs for 1970-71. Washington, D.C.: Author, 1970.

Yates, A. (ed.). The role of research in educational change. Palo Alto: Pacific Books, 1971.